

**CLAIMS**

1. A gas-powered device comprising:
  - a. an energy source;
  - b. at least one of a thermocouple and a thermopile generating a voltage representative of said energy source; and
  - c. a gas sensor powered by said voltage.
2. A method for powering a gas sensor, said method comprising:
  - a. producing energy with a gas-powered device;
  - b. producing a voltage representative of said energy with at least one of a thermocouple and a thermopile; and
  - c. powering said gas sensor with said voltage.
3. A method for providing power to a gas sensor comprising:
  - a. obtaining electrical power from at least one of a thermocouple and a thermopile;
  - b. converting said electrical power using a voltage regulator; and
  - c. providing said converted electrical power to said gas sensor.
4. The method of claim 3 wherein said electrical power converting comprises using a germanium transistor.
5. A gas sensing device comprising:
  - a. at least one of a thermocouple and a thermopile generating a voltage;
  - b. a voltage regulator converting said voltage thereby producing a converted voltage; and

- c. a gas sensor powered by said converted voltage.
6. The gas sensing device of claim 5 wherein said voltage regulator comprises an input and a germanium transistor connected to said input.
7. A power supply for producing an output at a given voltage value comprising:
- a. an input for receiving an input voltage varying in at least a first and a second voltage ranges, said second voltage range comprising voltage values above said first voltage range;
  - b. a primary voltage regulator capable of converting said input voltage from said first voltage range to said given voltage value when said input voltage comprises values in said first voltage range; and
  - c. a secondary voltage regulator capable of converting said input voltage from said second voltage range to said given voltage value when said input voltage comprises values in said first voltage range, said secondary voltage regulator being connected in parallel with said primary voltage regulator.
8. A method for producing an output at a given voltage value comprising:
- a. receiving an input voltage varying in at least a first and a second voltage ranges, said second voltage range comprising voltage values above said first voltage range;
  - b. when said input voltage comprises values in said first voltage range, converting said input voltage to said given voltage value; and
  - c. when said input voltage comprises values in said second voltage range, converting said input voltage to said given voltage value.
9. A voltage regulator for producing an output at a given voltage value comprising:
- a. an input for receiving an input varying in a voltage range; and

b. a germanium transistor connected to said input.